

REMARKS

By this Amendment, claim 4 is canceled without prejudice to or disclaimer of the subject matter contained therein, claim 1 is amended and claim 17 is added. Reconsideration of the present application is respectfully requested.

Claim 1 is amended to include the subject matter of dependent claim 4 to expedite prosecution of the above-identified patent application.

Entry of the amendments is proper under 37 CFR §1.116 since the amendments: (a) place the application in condition for allowance for the reasons discussed herein; (b) do not raise any new issue requiring further search and/or consideration since the amendments incorporate the subject matter of a canceled dependent claim into its independent claim or amplify issues previously discussed throughout prosecution; and (c) place the application in better form for appeal, should an appeal be necessary. The amendments are necessary and were not earlier presented because they are made in response to arguments raised in the final rejection. Entry of the amendments is thus respectfully requested.

I. The Claims Define Allowable Subject Matter

The Office Action rejects claims 1-4 under 35 U.S.C. §103(a) over U.S. Patent No. 5,494,835 to Bruel ("Bruel '835") in view of U.S. Patent No. 5,374,564 to Bruel ("Bruel '564"); and claim 9 under 35 U.S.C. §103(a) over Bruel '835 and Bruel '564 in further view of U.S. Patent No. 6,271,101 to Fukunaga. These rejections are respectfully traversed.

Bruel '835 and Bruel '564 do not disclose a method of manufacturing a semiconductor substrate "wherein a shape of an outer edge of said ion shield member is tapered toward an outermost edge thereof," as recited in independent claim 1.

The Office Action asserts that Bruel '835 discloses that lens-shaped edges can be formed in the substrate through the ion-splitting method (see Figures 9 and 10), which

inherently requires an ion shield member having an outer edge tapered toward an outmost edge. Applicants respectfully disagree.

Bruehl '835 discloses in Figures 9 and 10 a structure 51 approximating a cup 52 having stepped edges. Thus, Bruehl '835 requires, assuming that the ion shield member mimics the cup shape, an ion shield member having stepped edges, not tapered as asserted in the Office Action. Bruehl '564 does not make-up for the deficiencies of Bruehl '835.

The shape of the outer edge of an ion shield member being tapered toward the outermost edge thereof provides many beneficial improvements. For example, separation of a semiconductor substrate main body becomes easy, see specification at pages 7-8.

Accordingly, Applicants respectfully assert that the rejections under 35 U.S.C. §103 should be withdrawn because the applied references, either individually or in combination, do not teach or suggest each feature of independent claim 1.

The applied references do not disclose a method of manufacturing a semiconductor substrate including "separating said semiconductor substrate main body from said support substrate at a portion of said ion implantation layer in a condition that a thickness of a portion of the semiconductor substrate main body that is designed to form a drive circuit of the electro-optical apparatus is thick and a thickness of a portion of the semiconductor substrate main body that is designed to form an image display region of the electro-optical apparatus is thin," as recited in claim 17. Support for new claim 17 may be found in the specification at pages 10-12.

Bruehl '835 discloses regions 24, 25 and 26 having the same thickness, region 27 is slightly thicker and region 28 is even thicker. However Bruehl '835 does not disclose that the portion designed to form a drive circuit of the electro-optical apparatus is thick and the portion designed to form an image display region of the electro-optical apparatus is thin. In addition, Bruehl '564 does not disclose any variation in thickness.

MPEP §2143.03 instructs that "[t]o establish *prima facie* obviousness of a claimed invention, all the claimed limitations must be taught or suggested by the prior art. *In re Royka*, 409 F.2d 981, 180 USPQ 580 (CCPA 1974)."

For at least these reasons, it is respectfully submitted that independent claims 1 and 17 are patentable over the applied references. The remainder of the claims that depend from independent claim 1 are likewise patentable over the applied references for at least the reasons discussed above, as well as for the additional features they recite.

II. Conclusion

In view of the foregoing, it is respectfully submitted that this application is in condition for allowance. Favorable reconsideration and prompt allowance of claims 1-3, 9 and 17 are earnestly solicited.

Should the Examiner believe that anything further would be desirable in order to place this application in even better condition for allowance, the Examiner is invited to contact Applicants' undersigned representative at the telephone number set forth below.

Respectfully submitted,



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